

ABSTRACT

BOOSTED BRAKING DEVICE WITH EMERGENCY VALVE

Sub
A2

Braking device, for a motor vehicle, comprising: a master cylinder (2), a primary piston (3) mounted to slide in the master cylinder, a manual-control member (4), a booster coupled to the manual-control member, an emergency assist valve (VA) comprising a reaction piston (17a) and a rapid piston (17b), and a ratio control (T) actuated by a plunger distributor (10) driven by the manual-control member (4). The reaction piston (17a) and the rapid piston (17b) form one and the same stepped piston (17) having a part (17a) of large cross section and a part (17b) of small cross section, the large-section part (17a) determining, with a bore (18) of the primary piston (3), a variable-volume annular chamber (27). Separation/communication means (28, 29, 30), controlled by the displacement of the stepped piston (17), are designed so that the pressure of the liquid is exerted effectively on the large cross section (17a) of the stepped piston when the latter occupies its position of rest or is to the rear of this position, and on only the small cross section (17b) when the stepped piston is displaced forward relative to the main piston under emergency braking.

(Figure 2)